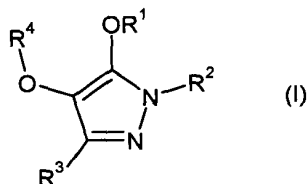


Claims

1. A compound of formula (I)



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or a pharmaceutically acceptable salt, solvate or derivative thereof, wherein:

- 10 R^1 is a five or six-membered, aromatic heterocyclic group containing (i) from 1 to 4 nitrogen heteroatom(s) or (ii) 1 or 2 nitrogen heteroatom(s) and 1 oxygen or 1 sulphur heteroatom or (iii) 1 or 2 oxygen or sulphur heteroatom(s), said heterocyclic group being optionally substituted by halo, oxo, -CN, -COR⁵, -CONR⁵R⁵, -SO₂NR⁵R⁵, -NR⁵SO₂R⁵, -OR⁵, OR¹¹, -NR⁵R⁵, -(C₁-C₆ alkylene)-NR⁵R⁵, R⁷ or R¹¹;
- 15 R^2 is H, C₁-C₆ alkyl, C₃-C₆ alkenyl, C₃-C₆ alkynyl, C₃-C₇ cycloalkyl, C₃-C₇ cycloalkenyl, phenyl, benzyl, R⁸ or R⁹, said C₁-C₆ alkyl, C₃-C₇ cycloalkyl, phenyl and benzyl being optionally substituted by halo, -OR⁵, -OR¹⁰, -CN, -CO₂R⁷, -OCONR⁵R⁵, -CONR⁵R⁵, -C(=NR⁵)NR⁵OR⁵, -CONR⁵NR⁵R⁵, -NR⁶R⁶, -NR⁵R¹⁰, -NR⁵COR⁵, -NR⁵COR⁸, -NR⁵COR¹⁰, -NR⁵CO₂R⁵, -NR⁵CONR⁵R⁵, -SO₂NR⁵R⁵, -NR⁵SO₂R⁵, -NR⁵SO₂NR⁵R⁵, R⁸ or R⁹;
- 20 R^3 is H, C₁-C₆ alkyl, C₃-C₇ cycloalkyl, phenyl, benzyl, halo, -CN, -OR⁷, -CO₂R⁵, -CONR⁵R⁵, R⁸ or R⁹, said C₁-C₆ alkyl, C₃-C₇ cycloalkyl, phenyl and benzyl being optionally substituted by halo, -CN, -OR⁵, -CO₂R⁵, -CONR⁵R⁵, -OCONR⁵R⁵, -NR⁵CO₂R⁵, -NR⁶R⁶, -NR⁵COR⁵, -SO₂NR⁵R⁵, -NR⁵CONR⁵R⁵, -NR⁵SO₂R⁵, R⁸ or R⁹;
- 25 R^4 is phenyl, naphthyl or pyridyl, each being optionally substituted by R⁸, halo, -CN, C₁-C₆ alkyl, C₁-C₆ haloalkyl, C₃-C₇ cycloalkyl, C₁-C₆ alkoxy, -CONR⁵R⁵, OR¹¹, So_xR⁶, O-(C₁-C₆ alkylene)-CONR⁵R⁵, O-(C₁-C₆ alkylene)-NR⁵R⁵, or O-(C₁-C₆ alkylene)-OR⁶;
- 30 each R⁵ is independently either H, C₁-C₆ alkyl or C₃-C₇ cycloalkyl or, when two R⁵ groups are attached to the same nitrogen atom, those two groups taken together with the nitrogen atom to which they are attached represent azetidiny, pyrrolidinyl, piperidinyl, homopiperidinyl,

piperazinyl, homopiperazinyl or morpholinyl, said azetidiny, pyrrolidinyl, piperidinyl, homopiperidinyl, piperazinyl, homopiperazinyl and morpholinyl being optionally substituted by C₁-C₆ alkyl or C₃-C₇ cycloalkyl;

- 5 each R⁶ is independently either H, C₁-C₆ alkyl or C₃-C₇ cycloalkyl;

R⁷ is C₁-C₆ alkyl or C₃-C₇ cycloalkyl;

- 10 R⁸ is a five or six-membered, aromatic heterocyclic group containing (i) from 1 to 4 nitrogen heteroatom(s) or (ii) 1 or 2 nitrogen heteroatom(s) and 1 oxygen or 1 sulphur heteroatom or (iii) 1 or 2 oxygen or sulphur heteroatom(s), said heterocyclic group being optionally substituted by halo, oxo, -CN, -COR⁵, -CONR⁵R⁵, -SO₂NR⁵R⁵, -NR⁵SO₂R⁵, -OR⁵, -NR⁵R⁵, -(C₁-C₆ alkylene)-NR⁵R⁵, C₁-C₆ alkyl, fluoro(C₁-C₆)alkyl or C₃-C₇ cycloalkyl;

- 15 R⁹ is a four to seven-membered, saturated or partially unsaturated heterocyclic group containing (i) 1 or 2 nitrogen heteroatom(s) or (ii) 1 nitrogen heteroatom and 1 oxygen or 1 sulphur heteroatom or (iii) 1 oxygen or sulphur heteroatom, said heterocyclic group being optionally substituted by oxo, C₁-C₆ alkyl, C₃-C₇ cycloalkyl, -SO₂R⁵, -CONR⁵R⁵, -COOR⁵, -CO-(C₁-C₆ alkylene)-OR⁵ or -COR⁵ and optionally substituted on a carbon atom which is not
20 adjacent to a heteroatom by halo, -OR⁵, -NR⁵R⁵, -NR⁵COR⁵, -NR⁵COOR⁵, -NR⁵CONR⁵R⁵, -NR⁵SO₂R⁵ or -CN;

R¹⁰ is C₁-C₆ alkyl substituted by R⁸, R⁹, -OR⁵, -CONR⁵R⁵, -NR⁵COR⁵ or -NR⁵R⁵;

- 25 R¹¹ is phenyl optionally substituted by halo, -CN, -COR⁵, -CONR⁵R⁵, -SO₂NR⁵R⁵, -NR⁵SO₂R⁵, -OR⁵, -NR⁵R⁵, -(C₁-C₆ alkylene)-NR⁵R⁵, C₁-C₆ alkyl, halo(C₁-C₆)alkyl or C₃-C₇ cycloalkyl; and

x is 0, 1 or 2.

- 30 2. A pharmaceutical composition comprising a compound according to claim 1 and one or more pharmaceutically acceptable excipients, diluents or carriers.

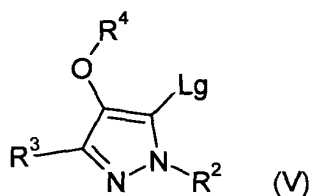
3. A pharmaceutical composition according to claim 2 comprising one or more additional therapeutic agents.

4. A compound according to claim 1 for use as a medicament.
5. A pharmaceutical composition according to claim 2 or 3 for use as a medicament.
- 5 6. A compound according to claim 1 for use as a reverse transcriptase inhibitor or modulator.
7. A pharmaceutical composition according to claim 2 or 3 for use as a reverse transcriptase inhibitor or modulator.
- 10 8. A compound according to claim 1 for use in the treatment of an HIV or genetically-related retroviral infection, or a resulting acquired immune deficiency syndrome (AIDS).
- 15 9. A pharmaceutical composition according to claim 2 or 3 for use in the treatment of an HIV or genetically-related retroviral infection, or a resulting acquired immune deficiency syndrome (AIDS).
- 20 10. A method for inhibiting or modulating HIV reverse transcriptase activity in a subject in need thereof comprising administering to said subject an effective amount of a compound according to claim 1.
- 25 11. A method for inhibiting or modulating HIV reverse transcriptase activity in a subject in need thereof comprising administering to said subject an effective amount of a pharmaceutical composition according to claim 2 or 3.
- 30 12. A method for treating an HIV or genetically-related retroviral infection, or a resulting acquired immune deficiency syndrome (AIDS) comprising administering to a subject in need thereof an effective amount of a compound according to claim 1.
13. A method for treating an HIV or genetically-related retroviral infection, or a resulting acquired immune deficiency syndrome (AIDS) comprising administering to a subject in need thereof an effective amount of a pharmaceutical composition according to claim 2 or 3.

14. A method of treating an HIV or a genetically-related retroviral infection, or a resulting acquired immune deficiency syndrome (AIDS), comprising administering an effective amount of a compound of formula (I), or a pharmaceutical composition according to claim 2 or 3.

- 5 15. A process for preparing the compound of formula (I) or a salt, solvate or pharmaceutically acceptable derivative thereof, which comprises:

(A) reacting a compound of formula (V)

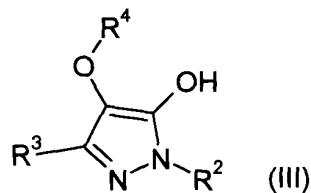


with an alcohol of formula (IV),

R¹-OH (IV);

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(B) reacting an alcohol of formula (III)



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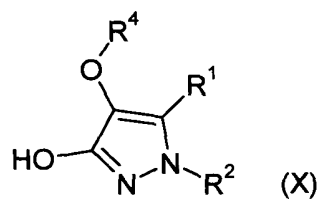
with a compound of formula (II),

Lg-R¹ (II);

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(C) reacting a compound of formula (III) with an alcohol of formula (IV) under dehydrating conditions;

(D) preparing a compound of formula (I) in which R³ is halo, halogenating a compound of formula (X)



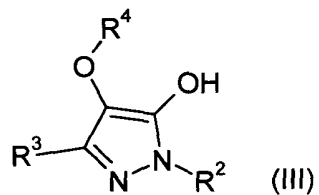
5 (E) interconverting a compound of formula (I) into another compound of formula (I); or

(F) deprotecting a protected derivative of compound of formula (I); and

optionally converting a compound of formula (I) prepared by any one of processes (A) to (F) into a pharmaceutically acceptable salt, solvate or derivative thereof.

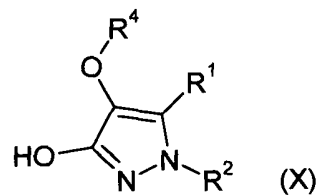
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16. A compound of formula (III), (IV) or (X)



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R¹-OH (IV);



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